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APPLICATION NO.	FILING DATE	FIRST NAMED INVENTOR	ATTORNEY DOCKET NO.	CONFIRMATION NO.
10/576,030	04/13/2006	Masanori Yamaguchi	TOYA149001APC	2081

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EXAMINER

MEAH, MOHAMMAD Y

ART UNIT	PAPER NUMBER
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1652

NOTIFICATION DATE	DELIVERY MODE
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02/22/2008

ELECTRONIC

Please find below and/or attached an Office communication concerning this application or proceeding.

The time period for reply, if any, is set in the attached communication.

Notice of the Office communication was sent electronically on above-indicated "Notification Date" to the following e-mail address(es):

jcartee@kmob.com
eOAPilot@kmob.com

Office Action Summary

Application No.

10/576,030

Applicant(s)

YAMAGUCHI ET AL.

Examiner

MD. YOUNUS MEAH

Art Unit

1652

-- The MAILING DATE of this communication appears on the cover sheet with the correspondence address --

Period for Reply

A SHORTENED STATUTORY PERIOD FOR REPLY IS SET TO EXPIRE 1 MONTH(S) OR THIRTY (30) DAYS, WHICHEVER IS LONGER, FROM THE MAILING DATE OF THIS COMMUNICATION.

- Extensions of time may be available under the provisions of 37 CFR 1.136(a). In no event, however, may a reply be timely filed after SIX (6) MONTHS from the mailing date of this communication.
- If NO period for reply is specified above, the maximum statutory period will apply and will expire SIX (6) MONTHS from the mailing date of this communication.
- Failure to reply within the set or extended period for reply will, by statute, cause the application to become ABANDONED (35 U.S.C. § 133). Any reply received by the Office later than three months after the mailing date of this communication, even if timely filed, may reduce any earned patent term adjustment. See 37 CFR 1.704(b).

Status

- 1) ☒ Responsive to communication(s) filed on 3/19/07.
- 2a) ☐ This action is **FINAL**. 2b) ☒ This action is non-final.
- 3) ☐ Since this application is in condition for allowance except for formal matters, prosecution as to the merits is closed in accordance with the practice under *Ex parte Quayle*, 1935 C.D. 11, 453 O.G. 213.

Disposition of Claims

- 4) ☒ Claim(s) 1-47 is/are pending in the application.
- 4a) Of the above claim(s) _____ is/are withdrawn from consideration.
- 5) ☐ Claim(s) _____ is/are allowed.
- 6) ☐ Claim(s) _____ is/are rejected.
- 7) ☐ Claim(s) _____ is/are objected to.
- 8) ☒ Claim(s) 1-47 are subject to restriction and/or election requirement.

Application Papers

- 9) ☐ The specification is objected to by the Examiner.
- 10) ☐ The drawing(s) filed on _____ is/ are: a) ☐ accepted or b) ☐ objected to by the Examiner.
Applicant may not request that any objection to the drawing(s) be held in abeyance. See 37 CFR 1.85(a).
Replacement drawing sheet(s) including the correction is required if the drawing(s) is objected to. See 37 CFR 1.121(d).
- 11) ☐ The oath or declaration is objected to by the Examiner. Note the attached Office Action or form PTO-152.

Priority under 35 U.S.C. § 119

- 12) ☐ Acknowledgment is made of a claim for foreign priority under 35 U.S.C. § 119(a)-(d) or (f).
- a) ☐ All b) ☐ Some * c) ☐ None of:
1. ☐ Certified copies of the priority documents have been received.
 2. ☐ Certified copies of the priority documents have been received in Application No. _____.
 3. ☐ Copies of the certified copies of the priority documents have been received in this National Stage application from the International Bureau (PCT Rule 17.2(a)).

* See the attached detailed Office action for a list of the certified copies not received.

Attachment(s)

- | | |
|------------------------------------------------------------------------------------------------------------|-----------------------------------------------------------------------------------------|
| 1) <input type="checkbox"/> Notice of References Cited (PTO-892) | 4) <input type="checkbox"/> Interview Summary (PTO-413)
Paper No(s)/Mail Date. _____ |
| 2) <input type="checkbox"/> Notice of Draftsperson's Patent Drawing Review (PTO-948) | 5) <input type="checkbox"/> Notice of Informal Patent Application |
| 3) <input type="checkbox"/> Information Disclosure Statement(s) (PTO/SB/08)
Paper No(s)/Mail Date _____ | 6) <input type="checkbox"/> Other: _____ |

DETAILED ACTION

The claims 1-47 are pending in the instant office action.

Election/Restrictions

Restriction is required under 35 U.S.C. 121 and 372.

This application contains the following inventions or groups of inventions, which are not so linked as to form a single general inventive concept under PCT Rule 13.1.

In accordance with 37 CFR 1.499, applicant is required, in reply to this action, to elect a single invention to which the claims must be restricted.

Group I claim(s) 1-5, 14-15, drawn to method of producing scyllo-inositol using microorganism expressing myoinositol 2-dehydrogenase

Group II claim(s) 6, 8-9, drawn to microorganism comprising of *Acetobacter sp* AB10281 strain or mutant thereof and producing myoinositol 2-dehydrogenase polypeptide using said strain.

Group III claim(s) 7, drawn to myoinositol 2-dehydrogenase polypeptide.

Group IV claim(s) 10-11, drawn to method of producing scyllo-inositol and scyllo-iose using myoinositol 2-dehydrogenase.

Group V claim(s) 16-18, drawn scyllo- inositol dehydrogenase polypeptide.

Group VI claim(s) 12-13, drawn to method of selecting scyllo-iose producing microorganism by detecting myoinositol 2-dehydrogenase activity.

Group VII claim 19-24, 47, drawn to DNA molecule encoding scyllo -inositol dehydrogenase comprising SEQ ID NO: 28, vector, and transformant expressing the said DNA and method producing said scyllo inositol dehydrogenase.

Groups VIII-XV claim 25-34, drawn to method of preparation of scyllo inositol dehydrogenase comprising SEQ ID NO: 28, 2, 4, 6, 8, 10, 12 or 14 wherein group VII refer to the method that produce protein of SEQ ID NO: 28 and group VIII that of SEQ ID NO: 2 and so on, wherein said method use myoinositol 2-dehydrogenase for their production as an ingredient.

Art Unit: 1652

Group XVI claims 35-46, drawn to method of preparation of purified scyllo inositol by chemical purification procedure.

The inventions listed as Groups I-XVI do not relate to a single general inventive concept under PCT Rule 13.1 because, under PCT Rule 13.2, they lack the same or corresponding special technical features for the following reasons:

The Nucleotides, vector and host cell (group VII), myoinositol 2-dehydrogenase (group III), scyllo- inositol dehydrogenase(group V) and microorganism (group II) are each unrelated and chemically distinct entities. Methods in groups I, IV, VI and groups VII-XVI are different methods involve distinct molecules for the processes to produce different products, such as to produce scyllo-inositol (group I), selecting active organism (group V), etc.

Furthermore', the technical feature linking group I-XVI appears to be that they all relate to microorganism expressing myoinositol dehydrogenase that produce scyllo - inositol. This type of microorganism expressing myoinositol dehydrogenase and that produce scyllo -inositol does not constitute a "special technical feature" as defined by PCT Rule 13.2, because it does not claim a feature, which defines a contribution over the prior art, as microorganism expressing myoinositol dehydrogenase and produce scyllo - inositol is known thorough Criddle et al (mol cell Biochem, 1977, 16, pp 3-8 from IDS).

Applicant is advised that the reply to this requirement to be complete must include an election of the invention to be examined even though the requirement is traversed (37 CFR 1.143).

Applicant is reminded that upon the cancellation of claims to a non-elected invention, the inventorship must be amended in compliance with 37 CFR 1.48(b) if one or more of the currently named inventors is no longer an inventor of at least one claim remaining in the application. Any amendment of

Art Unit: 1652

inventorship must be accompanied by a request under 37 CFR 1.48(b) and by the fee required under 37 CFR 1.17(i).

Any inquiry concerning this communication or earlier communications from the examiner should be directed to Mohammad Meah whose telephone number is 571-272-1261. The examiner can normally be reached on 8:30-5PM.

If attempts to reach the examiner by telephone are unsuccessful, the examiner's supervisor, Ponnathapu Achutamurthy can be reached on 571-272-0928. The fax phone number for the organization where this application or proceeding is assigned is 703-872-9306.

Information regarding the status of an application may be obtained from the Patent Application Information Retrieval (PAIR) system. Status information for published applications may be obtained from either Private PAIR or Public PAIR. Status information for unpublished applications is available through Private PAIR only. For more information about the PAIR system, see <http://pair-direct.uspto.gov>. Should you have questions on access to the Private PAIR system, contact the Electronic Business Center (EBC) at 866-217-9197 (toll-free).

A handwritten signature in black ink, appearing to read 'Mohammad Meah', with a long horizontal line extending to the left.

Mohammad Younus Meah, PhD

Examiner, Art Unit 1652

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